PATENT COOPERATION TREATY



PCT

INTERNATIONAL PRELIMINARY EXAMINATION REPORT

pilicent's or spent's file reference 000054100 finemational application No. PCT/BP2003/013467 28 November 2003 (28.11.2003) Priority date (day/manth/year) 28 November 2003 (28.11.2003) Potential palae (day/manth/year) 28 November 2003 (28.11.2003) Potential palae (day/manth/year) 28 November 2003 (28.11.2003) Potential palae (day/manth/year) 04 December 2002 (04.12.2002) Priority date (day/manth/year) 04 December 2002 (04.12.2002) Priority date (day/manth/year) 1. This international preliminary examination report has been prepared by this International Preliminary Examining Authority and is transmitted to the applicant according to Article 36. 2. This REPORT consists of a total of	IMTERMATIC	CPCT Article 36 and R	ule 70) See Notification of Transmittal of Internation Report (Form PCT/IPEA/4)	mal 16)
Applicant BASF AKTIENGESELLSCHAFT 1. This international preliminary examination report has been prepared by this International Preliminary Examining Authority and is trunsmitted to the applicant according to Article 36. 2. This REPORT consists of a total of	ternational application No. PCT/EP2003/013467 Approximal Patent Classification (IPC) or	International filing date (day/more 28 November 2003 (28.1)	preliminary Extension multyear) Priority date (day/month/year) multyear) Priority date (day/month/year)	
1. This international preliminary examination report has been prepared by this International Preliminary Examining Authority and is trunsmitted to the applicant according to Article 36. 2. This REPORT consists of a total of	C07F 15/00			
2. This REPORT consists of a total of	Applicant			
Date of submission of the demand 04 April 2005 (04.04.2005) 08 April 2004 (08.04.2004) Name and mailing address of the IPEA/EP Telephone No.	2. This REPORT consists of a total fine report is also according and are the barron. These annexes consists 3. This report contains indication in the second in the secon	mpanied by ANNEXES, i.e., sheets sis for this report and/or sheets con of the Administrative Instructions to of a total ofsheet ons relating to the following items: report is shment of opinion with regard to not ity of invention statement under Article 35(2) with and explanations supporting such show the second of the international application of this property is the second of the international application of the international application of the second of the international application of the second of the international application of the second of the international application of the internation of the	ding this cover sheet. It of the description, claims and/or drawings which has assiming rectifications made before this Authority (standar the PCT). S. Investigation and industrial applicability regard to novelty, inventive step and industrial application.	aye been see Rule
Name and mailing address of the IPEA/EP Telephone No.	Date of submission of the demand	nd 04 (08.04.2004)	Date of completion of this report 04 April 2005 (04.04.2005)
Telephone No.	3.3		Authorized officer	
Pacsimile No.			Telephone No.	

Form PCT/IPEA/409 (cover sheet) (July 1998)

<u></u> Àug. 23. 2005	4:44 PM-1
-----------------------	-----------

	NO	7667	ρ
_	110.	1001	١.,
١	International application No.		

		· · · · · · · · · · · · · · · · · · ·	Ministration - Paris				
•		TRACET	PCT/EP2003/013467				
	INTERNATIONAL PRELIMINARY EXAMINATION REPORT PCT/EP2003/013						
	INTERNATIONAL PREDICT						
1. B	asis of	the report					
1.5	With re		11.5led				
1"1	\neg	the international approximation	, as originally filed				
1	$\overline{\nabla}$	the description: 1-15	, as ongunary and				
1	فعسيكا	pages, filed with the l	etter of				
1		pages	totally filed				
1			, is digitally in the state of				
	\boxtimes	the claims: 1-7	ed (together with any statement under				
1		pages					
- 1		pages, filed with the	letter or				
1		pages, filed with the	, as originally filed				
1		1 the drawings:	, filed with the demand				
1	_	the drawings; pages pages pages pages pages	he letter of				
	1	pages, met with					
	1	the sequence listing part of the description:	, as originally filed				
	1	the sequence listing part of the description: pages Gled with	, filed with the demand				
	1	pages, filed with	the letter of the lenguage in which				
	and the second s						
	1_	an the elements must be display with the					
	12						
	1	With regard to the language, an siled, unless otherwise mineautory in the following the international application was filed, unless otherwise mineautory in the following the international application was available or furnished for the purposes of international the language of a translation furnished for the purposes of international application (under Rule the language of publication of the international application (under Rule the language of the translation furnished for the purposes of international application (under Rule the language of the translation furnished for the purposes of international application (under Rule the language of the translation furnished for the purposes of international application (under Rule the language of the translation furnished for the purposes of international application (under Rule the language of the translation furnished for the purposes of international application (under Rule the language).	(48.3(b)).				
	1	the language of publication of the international for the purposes of international for the purpose of	ional preiminary				
	1	the language of publication furnished for the purposes of internal the language of the translation furnished for the purposes of internal or 55.3). With regard to any nucleotide and/or amino acid sequence disclose sequence listing preliminary examination was carried out on the basis of the sequence listing preliminary examination.	d in the international application, the international				
	1	or 55-3).					
	- 1:	With regard to any nucleotide and/or amino acid sequence listing preliminary examination was carried out on the basis of the sequence listing					
	- }	contained in the international application in computer readable	form.				
	1	the marth the much the market and th	to the				
		furnished subsequently to this Authority in computer readable form. furnished subsequently to this Authority in computer readable form.	e listing does not go beyond the disclosure in and				
	'	filed together with the furnished subsequently to this Authority in written form. furnished subsequently to this Authority in computer readable form. furnished subsequently to this Authority in computer readable form. The statement that the subsequently furnished written sequently furnished.	the written sequence listing has				
		firmished subsequently to the subsequently furnished written sequently. The statement that the subsequently furnished international application as filed has been furnished. The statement that the information recorded in computer readal to statement that the information recorded in computer readal to statement that the information recorded in computer readal to statement that the information recorded in computer readal to statement that the information recorded in computer readal to statement that the information recorded in computer readal to statement that the subsequently furnished written sequently furnish	ole form is identical to the				
		The statement that the information to					
		LAND THINDUSE	· \				
		4. The amendments have resulted in the cancellation of:	,				
		4 the description, pages					
	•	the claims, Nos.	made, since they have been considered to go				
•		ine drawings	had not been made, and some some some some some some some some				
	the claims, Nos. the drawings, sheets/fig the drawings, sheets/fig This report has been established as if (some of) the amendments had not been made, since they have been considered to go This report has been established as if (some of) the amendments had not been made, since they have been considered to go the drawings, sheets/fig This report has been established as if (some of) the amendmental Box (Rule 70.2(c)).** This report has been established as indicated in the Supplemental Box (Rule 70.2(c)).** *Replacement sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to beyond the disclosure as filed, as indicated in the Supplemental Box (Rule 70.2(c)).** *Replacement sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to beyond the disclosure as filed, as indicated in the Supplemental Box (Rule 70.2(c)).** *Replacement sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to the receiving Office in response to an invitation under Article 14 are referred to beyond the disclosure as filed, as indicated in the Supplemental Box (Rule 70.2(c)).**						
	. •	beyond distributed to the receiving Office	enort since they do not contain unantendent				
	5. This report has been established, as indicated in the Supplemental Description of the disclosure as filed, as indicated in the Supplemental Description of the disclosure as filed, as indicated in the receiving Office in response to an invitation under Article 14 are referred to Replacement sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to this report since they do not contain amendments (Rule 70.16 in this report as "originally filed" and are not amended to this report and 70.17). **Any replacement sheet containing such amendments must be referred to under item I and annexed to this report.						
		and 70.17).	In warmen				
	** Any replacement but						

	AUG.	23.	2005-	4:44PM	4
--	------	-----	-------	--------	---

INTERNATIONAL PRELIMINARY EXAMINATION REPORT

International	application NO. 7667 P.	7
PCT/EP	03/13467	4

3	INTERNATIONALTICAL	or industrial applicability;
	with regard to not	velty, inventive step of industry
' .	Reasoned statement under Article 35(2) with regard to not statement estations and explanations supporting such statement	

/ .	Reasoned statement under River and explanations supporting citations and explanations supporting	such statement			
	Statement			1-7	YES
1.		Claims			NO
	Novelty (N)	Claims		1-7	YES
		Claims			NO
	Inventive step (IS)	Claims		17	YES
1	Industrial applicability (IA)	Claims			NO
1	Dionagram appropriate	Claims			
- 1			•		

Citations and explanations 2.

This report makes reference to the following document:

D1: EP-A-719758

Document D1 is considered to constitute the prior art closest to the subject matter of claim 1 and discloses metal complexes and their use as catalysts for coupling reactions.

The subject matter of claim 1 differs from those known metal complexes in that the metal complexes contain N'substituted N-acylamidines as ligands, while the metal complexes disclosed in D1 contain heterocyclic carbenes as ligands.

The subject matter of claim 1 is therefore novel (PCT Article 33(2)).

The present invention can therefore be considered to address the problem of providing further transition metal complexes that can be used as catalysts for coupling reactions.

The solution to this problem, as proposed in claim 1 of

International application 7667—P. 8 PCT/EP 03/13467

INTERNATIONAL PRELIMINARY EXAMINATION REPORT

the present application, involves an inventive step (PCT Article 33(3)) because the claimed transition metal complexes are structurally very remote from the compounds disclosed in D1, and because there are no hints that could prompt a person skilled in the art to modify the compounds disclosed in D1 in such a way as to arrive at the claimed compounds.

Claims 2-7 are dependent on claim 1 and therefore also meet the PCT novelty and inventive step requirements.

Â.